

TITLE OF THE INVENTION

ELECTRONIC BID METHOD AND ELECTRONIC BID SYSTEM

CROSS REFERENCE TO RELATED APPLICATIONS

This is a Continuation Application of PCT  
5 Application No. PCT/JP00/06572, filed September 25,  
2000, which was not published under PCT Article 21(2)  
in English.

This application is based upon and claims the  
benefit of priority from the prior Japanese Patent  
10 Application No. 2000-234507, filed August 2, 2000, the  
entire contents of which are incorporated herein by  
reference.

BACKGROUND OF THE INVENTION

1. Field of the Invention

15 The present invention relates to an electronic bid  
scheme (merchandise providing information notification  
scheme) and, more particularly, to a scheme for  
allowing a seller to sell an item to a buyer upon  
collecting data representing buyers' purchase  
20 consensuses in a system for selling and buying  
merchandise/services using a network.

2. Description of the Related Art

In a system for selling and buying merchandise  
using a network, a method of making a buyer search for  
25 and select a seller on a Web results in a waste of time  
and communication cost in finding out a seller who  
offers desired merchandise at low cost. It is almost

impossible to select an optimal seller among enormous  
information of a network. In addition, in a so-called  
reverse auction scheme in which a seller accepts or  
declines a buyer's bid, the seller must make a decision  
5 for the request of each individual user, resulting in  
an overload on the seller side.

As described above, in the conventional scheme, a  
buyer wastes time and communication cost before he or  
she can find out a seller who offers buyer's desired  
10 merchandize at low cost. In the reverse auction scheme,  
an overload was imposed on the seller side because the  
seller must make a decision for the request of each  
individual user.

#### BRIEF SUMMARY OF THE INVENTION

15 The present invention has been made in  
consideration of the conventional problems described  
above, and has as its object to provide an electronic  
bid method and electronic bid system capable of  
allowing a buyer to select a seller offering the best  
20 condition by allowing the seller to sell an item to the  
buyer upon collecting data representing buyers'  
purchase consensuses in a system for selling and  
purchasing merchandise/services using a network.

In order to achieve the above object, according to  
25 the present invention, there is provided an electronic  
bid method characterized in that a buyer registers  
desired merchandise/service information in a database

of a service provider via a network, the service provider discloses to a seller via the network information including the number of potential buyers for each merchandise/service on the basis of the registered merchandise/service information, the seller determines a sales condition on the basis of the disclosed information and notifies the service provider of merchandise providing information, and the service provider notifies the potential buyers of the merchandise providing information notified from the seller.

An electronic bid system according to the present invention is an electronic bid system for allowing a service provider to serve as an agent in a sales transaction between a buyer and a seller via a network, characterized by comprising purchase merchandise/service information processing means comprised of means for storing merchandise/service information to be purchased by a buyer and means for notifying a seller of the number of potential buyers for each merchandise/service on the basis of the merchandise/service information to be purchased and stored in the storing means, and sales merchandise/service information processing means comprised of means for notifying the service provider of a sales condition determined by the seller and means for notifying the buyer of the sales condition notified from the seller.

According to the present invention, in the system for selling and purchasing merchandise/services using the network, the seller collects the data representing the buyers' purchase consensuses and sells merchandise based on the consensuses. A buyer notifies a service provider serving as an agent for sales/purchase information of buyer's desired merchandise/service by mail or an input from a Web. The service provider registers the buyer's desired merchandise/service in a database. Of all the registered data, the category of the buyer's desired merchandise and the number of potential buyers for this merchandise are disclosed from the service provider to the seller. The seller browses the disclosed data and provides information such as a price to the buyer by electronic mail or on the Web via the service provider. This does not overload the seller and makes it possible for a buyer to select a seller offering the best condition. That is, the seller makes a bid for a buyer's request, and the buyer can know the best seller. This system can eliminate cumbersome operation of the seller's bids for individual buyers. Once the buyers' requests are stored in the database, only macro data of the merchandise category and the number of potential users (quantity of merchandise) are disclosed. This allows the seller to make bids for some quantity. Since only the macro data are disclosed to the seller, leakage of

personal information of users can be prevented. The database display for each seller can be customized to display only necessary merchandize categories. When the seller sends merchandize providing information, the number of users of the database to be displayed is reset to prevent the same information from being repeatedly sent.

According to the present invention, once the buyers' requests are stored in the database of the service provider, only macro data, i.e., the merchandise category and the number of potential users (quantity of merchandise) are disclosed. This allows the seller to make bids for some quantity. The seller need not make a bid for each individual buyer, resulting in convenience.

#### BRIEF DESCRIPTION OF THE SEVERAL VIEWS OF THE DRAWING

An embodiment of the present invention will be described with reference to the following accompanying drawings, in which

FIG. 1 is a block diagram of a system to which an electronic bid method of the present invention is applied;

FIG. 2 is a flow chart showing processing of the electronic bid method according to the present invention;

FIG. 3 is a view showing the data format of desired request information of buyers registered in the

database of a service provider in the system shown in FIG. 1;

FIG. 4 is a view showing a table in which information representing the number of buyers is stored in relation to information representing sellers who deal purchase request merchandise items for each purchase request merchandise item; and

FIG. 5 is a conceptual view showing the data flow between the user, service provider, and seller in the system shown in FIG. 1.

#### DETAILED DESCRIPTION OF THE INVENTION

The present invention will be described in detail by way of its illustrated embodiment.

FIG. 1 is a block diagram showing a system to which an electronic bid scheme of the present invention is applied. Referring to FIG. 1, a service provider 1 functioning as an agent is connected to a buyer's terminal 5 via a network 3 and to a seller's terminal 9. The service provider 1 has a database 11 in which purchase request merchandize/service information transmitted from a buyer is registered.

FIG. 2 is a flow chart showing processing of an electronic bid scheme according to the present invention. FIG. 3 is a conceptual view showing the flow of data exchanged between a buyer, seller, and service provider.

In step S1 of FIG. 2, each seller is registered.

That is, a seller who wants to sell merchandize/  
services makes agreement with the service provider and  
registers himself or herself. In this case, the  
category of merchandize/services is registered.

5           FIG. 3 shows the format of buyer's purchase  
request information registered in the database of the  
service provider. As shown in FIG. 3, the format has a  
user ID field for specifying a buyer, a purchase  
request merchandize (code information) field, and a  
10           quantity field. FIG. 4 is a table which stores a list  
of sellers for each merchandize item. The service  
provider calculates the quantity for each merchandize  
item from the table shown in FIG. 3, refers to the list  
shown in FIG. 4, and notifies the seller of the  
15           purchase request quantity for each merchandize item.  
Browse

          In step S3 of FIG. 2, buyer's purchase request  
information is registered. More specifically, as shown  
in FIG. 5, each user accesses the predetermined Web  
20           page of the service provider and registers purchase  
request merchandize/service information. This  
information may be registered by a method of sending  
information in a predetermined format using electronic  
mail.

25           In step S5 of FIG. 2, a database is constructed  
and disclosed. More specifically, the service provider  
constructs a database for the number of potential

buyers for the merchandize/services of a specific category on the basis of the purchase request merchandize/service information (number of merchandize items) transmitted from the users. A database to be disclosed is customized for each seller. The merchandize/service information is disclosed to a seller within the range of the category of merchandize which the seller deals. A method of disclosing a database is shown in FIG. 5. That is, a seller accesses the service provider, and browses a Web page constructed for each seller. Alternatively, a seller is notified of the database by the service provider via electronic mail.

In step S7 of FIG. 2, merchandize providing information is notified. That is, a seller determines merchandize/service providing conditions, i.e., a price, merchandize specifications, and purchase method on the basis of the revised information of the database, its own stock, and purchasing price. The service provider is notified of the determined merchandize providing information. More specifically, as shown in FIG. 5, the seller prepares merchandize providing information mail including the merchandize specifications, price, purchasing method, and transmission request message and sends it to the service provider. Note that the merchandize providing information may be notified not by sending electronic mail but by inputting the



information on the Web page provided by the service provider.

In step S7 of FIG. 2, the merchandize providing information is notified. That is, all the potential buyers for the merchandize/services of the category of interest are notified of the merchandize providing information of the seller from the service provider. The merchandize providing information may be notified by sending electronic mail or writing the information on the Web page prepared for only each potential buyer. Similarly, each potential buyer is notified of merchandize providing information from other sellers. The number of potential buyers in the database for each seller is cleared when the merchandize providing information is notified from each seller. Each seller only presents the merchandize providing information to each potential buyer at this time. The number of potential buyers on the database can always be new information which represent those who have not presented merchandize providing information to new potential buyers.

In step S9 of FIG. 2, a sales agreement is made. That is, as shown in FIG. 3, each user browses the merchandize providing information provided by one or more sellers, checks the sales conditions of the respective sellers, and determines the best seller. The user directly accesses the determined seller

via the Web page, electronic mail, telephone, or FAX. A sales agreement is made between the user and seller.

5 Note that once a sales agreement is made, the buyer notifies the service provider of cancellation of the purchasing will. The service provider deletes the database information concerning this buyer. The remaining sellers who can make no sales agreement with this user can know that a sales agreement has been made  
10 with another seller by browsing the database of the service provider.

A method of canceling the purchasing will can be done within a predetermined due date. More specifically, once a user registers purchase request  
15 information, the predetermined due date is set, and the service provider instructs sellers to provide merchandize providing information within the predetermined due date. The purchasing will is canceled at the end of the due date. As shown in  
20 FIG. 5, each user transmits a clear mail/command to the service provider. The service provider clears the corresponding information (purchase request merchandize/service information) from the database on the basis of the clear mail/command.

25 The present invention has been described for a specific embodiment under specific conditions. Many changes and modifications may obviously be made within

the scope of the invention without departing from the appended claims.